

DISCUSSION

1. Claim rejections under 35 USC § 112

Claim 1 (new claim 12): Claim 1 was rejected because it was "unclear whether 'the projected longitudinal axis' line 11 refers to the centerline of the longitudinal element". In new claim 12, words have been added to specifically define the longitudinal axis "as the locus of points that are centroids of all cross sections of the cylinder".

Instead of specifying an exterior surface of the longitudinal element as a cylinder, it is now described as being substantially a cylinder, thus allowing for the diagonal surface ribs present on steel rebar used for the preferred embodiment as described in the specification and illustrated in Fig. 2A.

Examiner points out that there is insufficient antecedent basis for "the projected longitudinal axis" limitation in the claim. In new claim 12, words have been added to show that the longitudinal axis also is to be projected thereby specifically defining the "projected longitudinal axis". With this more specific definition of the "longitudinal axis" and the "projected longitudinal axis", there is now sufficient antecedent basis.

Further, to make clearer the meaning of the description in lines 12 and 13, the description "both directions measured perpendicularly" has been changed to "both of the opposed directions each measured perpendicularly".

Claim 2 (new claim 13): While dependent claim 2 was not rejected under 35 USC § 112, Applicant has changed the word "attaching" to "fixing" (line 17) for consistency with independent claim 1 (new claim 12).

Claim 3 (new claim 14): Claim 3 was rejected because "it is unclear what the dimension given in describing 'a 1/2 inch steel flat washer' (line 2) refers to". In new claim 14, the 1/2 inch dimension is specifically referenced as the "interior diameter" of the washer.

Claim 11 (new claim 15): Claim 11 was rejected because "it is unclear what constitutes a

1 'conventional steel T-post' line 2". Applicant accepts Examiner's objection although the claim defines it
2 as "having substantially a T-shaped cross section" (line 2), the specification (page 1, line 7) uses this
3 same language, and drawing Fig. 3A illustrates such a T-post. New claim 15 has been modified by
4 referring to the T-post as a "prior art steel T-post".

5 These new claims address the objections of Examiner to the cancelled claims by particularly
6 pointing out and distinctly claiming the subject matter which Applicant regards as his invention.

7 If there is reason for Examiner to reject new claims 12 through 15 under 35 USC § 112,
8 Applicant respectfully requests Examiner's assistance in rewriting these claims so that they satisfy USC
9 § 112.
10

11 **2. Claim rejections under 35 USC § 102**

12 MontGuide MontGuide describes a system of modifying (drilling) a pair of insulators to attach a
13 longitudinal element to a T-post.

14 The present invention does not read on the MontGuide prior art for the following reasons:

15 A.) The MontGuide description shows that the insulators (described by Examiner as equivalent
16 to the present invention's stop element) are not intended as a part of a T-post extender. Rather these
17 insulators are separate elements acting as an intermediate means for attaching an extension to a T-post.
18 They serve as both a vertical stop and as restraints to capture the extension laterally to the T-post.
19 Applicant's T-post extender has a stop element (item 10, Fig. 1, Fig. 2A, and Fig. 3A) that is clearly a
20 part of the extender and functions solely to position the extender vertically. Lateral capture of the
21 extender adjacent a T-post is provided by one or more wire ties (items 6, Fig. 1, Fig. 2A, and Fig. 3A)
22 that are already present as part of an existing fence, or will be present in the case of new fence. These
23 details are described in the specification page 6 paragraph starting on line 20 and page 8 paragraphs
24 starting on line 8 and on line 23 as well as on Fig. 1 and Fig. 3A.

25 B.) From MontGuide Figure 2 (page 5), referenced by the text (page 4), two insulators are

1 required for each T-post. Each must be snapped onto the T-post. From an engineering perspective, one
2 such insulator used to laterally capture the extender would be insufficient to restrain any significant
3 moment caused by a lateral force applied to the extender. In Applicant's invention, only one stop
4 element is required. Applicant's stop element is a necessary component of Applicant's T-post extender
5 and serves only to position the extender vertically relative to a T-post. Lateral capture of the T-post
6 extender so it is nestled adjacent the T-post giving sufficient moment restraint is by one or more wire ties
7 (items 6 of Fig. 1 and Fig. 3A of Applicant's disclosure) which serve also to support fence wire.

8 C.) MontGuide describes a process of drilling insulators to fit a rebar or fiberglass extender. It
9 is unclear that the precision of drilling these holes would be sufficient to allow a simple insertion of the
10 extender and yet maintain the friction properties required over the long term to provide a positive vertical
11 stop for the extender.

12 D.) Applicant's invention is simpler and more economical because it makes use of wire ties to
13 laterally capture Applicant's T-post extender that are present anyway to support fence wire to a T-post in
14 the case of existing fence, or will be present in the case of new fence. In Applicant's preferred
15 embodiment, which makes use of rebar as the longitudinal element of the extender and a steel flat washer
16 as the stop element, it is less expensive to acquire and attach the washer to the rebar than it is to acquire,
17 drill and attach two insulators to a T-post as described by MontGuide (page 4).

18 E.) In the case of existing fence, where one wishes to increase its height, Applicant's T-post
19 extender is particularly convenient to install. The installer walks along the existing fence and drops an
20 extender into place from the top of the T-post so that it slides down into position along the T-post
21 between the T-post and existing wire tie(s). This can be done almost without breaking stride.
22 Installation of the MontGuide extender is more difficult.

23 In summary, while MontGuide describes the long-standing need for an economical T-post
24 extender and high fence support and has identified a means for providing this, the present invention is not
25 the same, is simpler and less expensive, is more convenient to use, and makes dual use of fence

components, i.e., wire ties that are used both to attach fence wire to a T-post and also to laterally capture a T-post extender adjacent the T-post.

3. Claim rejections under 35 USC § 103

Montguide describes the need for an economical high fence support and gives a solution involving T-posts and a T-post extender that is different from the present invention (see 2 above).

SARE describes movable paddock posts comprised of rebar with a washer welded along it six inches from a first end and a second welded washer capturing a length of PVC pipe. An insulator is attached to the post. Presumably, the second welded washer and the insulator are located near the second end of the rebar. While it is not clear from the SARE description, one can assume that the six inch length of rebar extending past the washer on the first end is for insertion into the earth to hold the post upright and that the insulator at the other end is for attachment of a single electric fence wire.

While the SARE device uses rebar and a welded-on washer, it also uses a second welded-on washer, a length of PVC pipe, and an insulator. The present invention uses only one welded washer, no PVC pipe, and no insulator. Use of the SARE device as a T-post extender is neither suggested nor anticipated by SARE. It is clear from SARE that the application is different; SARE's application being movable electric fence posts for control of cattle between paddocks for more efficient grazing. Control of cattle does not require use of T-post extenders or high fence supports.

One of the novel aspects of Applicant's invention is recognition that wire ties holding fence wire to a T-post may also be used without modification to laterally capture Applicant's T-post extender adjacent the T-post. While this may seem obvious in retrospect, it is not obvious from the prior art; else, because of its advantages, this innovation would have been implemented to solve the deer fence problem by those skilled in the art at the time of Applicant's invention.

Neither SARE, nor any other of the prior art, either singly or in combination has anticipated or suggested use of the SARE post or any similar device for use as a T-post extender in the manner

disclosed by Applicant.

Talt describes use of T-posts with bamboo poles wired to them for extra height (page 7). The upper two figures of Talt's page 7 illustrate the idea.

The Talt approach would not allow a bamboo pole to be inserted adjacent a T-post using existing wire ties as lateral support because the diameter of the bamboo pole is too large for the bamboo to fit between the wire ties and a T-post. From the referenced Talt figures, the illustrated bamboo poles are clearly much larger than the 1/2 inch called out in Applicant's claim 1 (new claim 12). This maximum dimension was specified by Applicant because of the restricted space between wire ties and T-post for an existing fence where its height is to be increased by slipping a T-post extender into position between the T-post and existing wire ties (see specification paragraphs beginning on page 9, lines 14 and 24 and Fig. 3A). Bamboo poles of diameter 1/2 inch or less would not withstand bending moments of 200 pound-inch as required by Applicant's claim 1, (new claim 12). This would introduce stress in the bamboo of about 16,300 pounds per square inch in the case of a 1/2 inch diameter bamboo pole. As opposed to Applicant's invention, lateral restraint of Talt's bamboo poles is provided by wiring them to the T-posts. It is clear from the Talt description and the referenced two figures, that this wiring is intended as a separate required element and step in the installation that does not serve the dual purpose of supporting the fencing material (in this case deer netting). Certainly, it is not the intent to slip a bamboo pole between the T-post and wire ties.

Reasons for the patentability of the present invention over MontGuide, SARE, and Talt

A.) Both MontGuide and Talt discuss the importance of the deer fence problem and the desirability of a low cost solution. Neither of the T-post extension approaches of MontGuide or Talt provides the simplicity, economy or ease of installation as Applicant's invention. SARE does not suggest the possibility of using its temporary paddock posts as T-post extenders in a high fence support application, there is no anticipation or suggestion concerning their lateral capture adjacent T-posts by

1 wire ties, and it is clear that the SARE temporary posts are not as simple or economical as Applicant's
2 invention.

3 B.) The need for a simple, economical, and easily installed increase in height of existing
4 fence or of providing an initial high fence to prevent deer from getting through is a long-standing and
5 important problem whose solution will have major economic benefits. This is clear, not only from
6 discussion in Applicant's specification, but also from the discussions in MontGuide and Talt.
7 Applicant's T-post extender and high fence support provide a new and novel solution to this increasingly
8 important problem. As anecdotal evidence of the economic importance of this invention, one of
9 Applicant's neighbors lost 4400 heads of cabbage, comprising two thirds of their cabbage crop, to
10 depredation by deer during the 2005 growing season because of the lack of an economical solution for
11 deer fence.

12 C.) There are solutions to the deer fence problem, e.g. MontGuide and Talt. However, a
13 drive past existing orchards and gardens in areas heavily populated by deer will reveal that solutions are
14 usually straight-forward, obvious, and involve use of long expensive posts that are difficult to install.
15 Applicant's invention is a solution that is simpler, more economical to manufacture and ship, and more
16 convenient to install than any of the prior art, especially in the case where existing fence using T-posts is
17 to be increased in height. The deer fence problem may be considered wide-spread and the existing
18 solutions to be representative of a "crowded art". This would militate in favor of patentability, even if
19 the improvement were small.

20 D.) Applicant has not been successful in finding any solution to the deer fence problem that
21 is as simple, as economical, or as easily installed as his invention. Given the recognized wide-spread
22 nature and commercial importance of the problem, e.g. protection of orchards and other agricultural
23 crops, if Applicant's invention were obvious from any of the prior art references, either singly or in
24 combination, because of its advantages, those skilled in fence post art at the time of Applicant's
25 invention would have implemented it by now.

1 E.) None of the referenced prior art contains any reference, anticipation, or suggestion that it
2 could be modified to yield Applicant's invention.

3 F.) The prior-art references do not contain any suggestion (express or implied) that they be
4 combined, or that they be combined to yield Applicant's invention.

5
6 Consideration of other prior art made of record but not relied upon.

7 Fickle-- Describes using a short T-post (5 ft. length) driven into the ground and then attaching a
8 length of rebar to the T-post as a height extender. The purpose is to repel deer, but no details as to the
9 method of attaching the rebar are provided. Nothing in the description would indicate or suggest
10 Applicant's invention.

11 Lavelly-- Discusses fence posts with a laterally bent arms at their upper ends. Lavelly does not
12 address the high fence problem for deer. Applicant's invention is not anticipated.

13 Terry-- Discusses a two piece pole for telegraph and similar wires comprised of a T rolled lower
14 portion and an upper section clamped to the lower portion. The upper section has no similarity to
15 Applicant's T-post extender and there is no similarity in the combination of Terry's upper section and
16 lower portion to Applicant's high fence support.

17 Horvath-- A fence is described consisting of a plurality of sections, each section comprising a
18 post, upper and lower rails, sockets in outer ends of upper and lower rails and vertical and transverse
19 openings. The arrangement allows for joining sections and for inserting rods for extending the height of
20 the fence. The arrangement is not similar to Applicant's T-post extender and high fence support.

21 Reznicek-- An electric fence post is described comprised of upper and lower sections separated
22 by an insulator that mechanically receives the upper part of the lower section and lower part of the upper
23 section. By this means the upper part of the fence post is insulated from ground thereby obviating the
24 need for wire support insulators. The post has no similarity to Applicant's invention.

25 Sansbury-- An apparatus and method is described for enabling changes in height of a cross bar

1 in athletic equipment, e.g. pole vaulting. This apparatus and method is not similar to Applicant's
2 invention.

3 Sanford-- An intrusion detection device is described for security fencing. This device uses a
4 spring constrained arm in a fence post extension. Too much motion of this arm caused by an intruder
5 climbing the fence will trip an alarm. This device is not similar to Applicant's invention.

6 Nothing in any of Fickle, Lavelly, Terry, Horvath, Reznicek, Sansbury, or Sanford et al. suggests
7 or anticipates Applicant's invention.

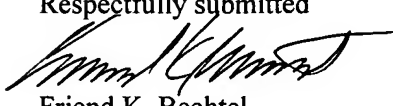
8 9 **SUMMARY**

10 Applicant has diligently studied the reasons for Examiner's rejection of claims under 35 USC §
11 112 and has engaged in a telephone conversation with Examiner (11/29/05) in an attempt to further
12 clarify these issues. New modified claims 12 through 15 have been written so that they more particularly
13 point out and distinctly claim the subject matter which Applicant regards as his invention. If Examiner
14 finds further reason to reject these claims under 35 USC § 112, Applicant respectfully requests assistance
15 by phone (509-238-2444) or in writing to further modify them so that they are acceptable under 35 USC
16 § 112.

17 Applicant has carefully reviewed the prior art of MontGuide which served as the basis for
18 Examiner's rejection under 35 USC § 102 and has identified clear and patentable differences over
19 MontGuide that are not anticipated by MontGuide (see above discussion).

20 Applicant has carefully reviewed the prior art of MontGuide, SARE, and Talt, which served as
21 the basis for Examiner's rejection under 35 USC § 103 and has identified reasons why the differences of
22 Applicant's invention over this prior art are not anticipated by the prior art, represent clear advantages
23 over the prior art, and would not have been obvious to those skilled in the art and familiar with this prior
24 art at the time of Applicant's disclosure.

Respectfully submitted


Friend K. Bechtel
Applicant Pro Se

Certificate of Mailing

I hereby certify that this correspondence will be deposited with
the United States Postal Service by First Class Mail, postage
prepaid, in an envelop addressed to:

COMMISSIONER FOR PATENTS

P.O. Box 1450

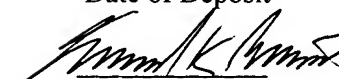
Alexandria, Virginia 22313-1450

12/1/05

Date of Deposit

Friend K. Bechtel

Name of Applicant



Signature

12/1/05

Date